

1. In a computer system that is configured to run one or more software modules, a method for testing the functionality of the one or more software modules as executed on the computer system as the computer system interfaces with one of a plurality of projected use patterns, the one or more software modules capable of performing a plurality of standard functions, the method comprising the following:

an act of representing probability weights for at least one of the plurality of standard functions for each of the plurality of use patterns;

an act of a selecting one of the plurality of projected use patterns for testing, the selected use pattern having a probability weight assigned to each of a plurality of standard functions that may be performed as the computer system interfaces with the selected projected use pattern; and

a step for determining a standard function to perform based on the probability weight corresponding to the standard function for the selected projected use pattern.

2. A method in accordance with Claim 1, wherein at least some of the probability weights are implicit.

3. A method in accordance with Claim 2, wherein at least one of the standard functions for at least one of the plurality of projected use patterns lacks a probability weight to imply a zero probability of occurrence for that standard function for that projected use pattern.

4. A method in accordance with Claim 2, wherein at least one of the standard functions for at least one of the plurality of projected use patterns lacks a probability weight

to imply an unknown zero probability of occurrence for that standard function for that projected use pattern.

5. A method in accordance with Claim 1, wherein the act of representing probability weights for at least one of the plurality of standard functions for each of the plurality of use patterns comprises the following:

an act of representing probability weights for at least a phone function for each of the plurality of projected use patterns.

6. A method in accordance with Claim 1, wherein the act of representing probability weights for at least one of the plurality of standard functions for each of the plurality of use patterns comprises the following:

an act of representing probability weights for at least an email function for each of the plurality of projected use patterns.

7. A method in accordance with Claim 1, wherein the act of representing probability weights for at least one of the plurality of standard functions for each of the plurality of use patterns comprises the following:

an act of representing probability weights for at least a Web function for each of the plurality of projected use patterns.

8. A method in accordance with Claim 1, wherein the act of selecting one of the plurality of projected use patterns for testing comprises the following:

an act of receiving a user selection of one of the plurality of projected use patterns for testing.

9. A method in accordance with Claim 1, wherein the step for determining a standard function to perform comprises the following:

- an act of generating an arbitrary value;
- an act of comparing the arbitrary value to the probability weight, or a value derived from the probability weight, assigned to the standard function; and
- an act of determining that the standard function is to be performed based on the comparison.

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10. In a computer system that is configured to run one or more software modules, a method for testing the functionality of the one or more software modules as executed on the computer system as the computer system interfaces with one of a plurality of projected use patterns, the one or more software modules capable of performing a plurality of standard functions, the method comprising the following:

an act of representing probability weights for at least one of the plurality of standard functions for each of the plurality of use patterns;

an act of a selecting one of the plurality of projected use patterns for testing, the selected use pattern having a probability weight assigned to each of a plurality of standard functions that may be performed as the computer system interfaces with the selected projected use pattern;

an act of generating an arbitrary value;

an act of comparing the arbitrary value to the probability weight, or a value derived from the probability weight, assigned to a particular standard function; and

an act of determining that the particular standard function is to be performed based on the comparison.

11. A method in accordance with Claim 10, wherein the act of representing probability weights for at least one of the plurality of standard functions for each of the plurality of use patterns comprises the following:

an act of representing probability weights for at least a phone function for each of the plurality of projected use patterns.

12. A method in accordance with Claim 10, wherein the act of representing probability weights for at least one of the plurality of standard functions for each of the plurality of use patterns comprises the following:

an act of representing probability weights for at least an email function for each of the plurality of projected use patterns.

13. A method in accordance with Claim 10, wherein the act of representing probability weights for at least one of the plurality of standard functions for each of the plurality of use patterns comprises the following:

an act of representing probability weights for at least a Web function for each of the plurality of projected use patterns.

14. A method in accordance with Claim 10, wherein the act of selecting one of the plurality of projected use patterns for testing comprises the following:

an act of receiving user selection of one of the plurality of projected use patterns for testing.

15. A method in accordance with Claim 10, further comprising the following:

an act of representing a plurality of tests that may be performed in response to determining that the particular standard function is to be performed.

16. A method in accordance with Claim 15, wherein the act of representing a plurality of tests that may be performed comprises the following:

an act of representing each of the plurality of test as an executable file.

17. A method in accordance with Claim 15, wherein the act of representing a plurality of tests that may be performed comprises the following.

an act of representing each of the plurality of test as a script file.

18. A method in accordance with Claim 15, wherein the act of representing a plurality of tests that may be performed comprises an act of representing each of the plurality of test as an executable file, the method further comprising the following:

an act of determining a particular executable file to execute by navigating a probability tree associated with the particular standard function for the selected projected use.

19. A method in accordance with Claim 18, wherein the particular probability tree is common for the particular standard function across all of the projected use patterns.

20. A method in accordance with Claim 18, wherein the particular probability tree is different for the particular standard function for at least some of the projected use patterns.

21. A computer program product for use in a computer system that is configured to run one or more software modules, the computer program product for implementing a method for testing the functionality of the one or more software modules as executed on the computer system as the computer system interfaces with one of a plurality of projected use patterns, the one or more software modules capable of performing a plurality of standard functions, the computer system representing probability weights for at least one of the plurality of standard functions, the computer program product comprising one or more computer-readable media having stored thereon the following:

computer-executable instructions for selecting one of the plurality of projected use patterns for testing, the selected use pattern having a probability weight assigned to each of a plurality of standard functions that may be performed as the computer system interfaces with the selected projected use pattern;

computer-executable instructions for causing an arbitrary value to be generated;

computer-executable instructions for comparing the arbitrary value to the probability weight, or a value derived from the probability weight, assigned to a particular standard function; and

computer-executable instructions for determining that the particular standard function is to be performed based on the comparison.

22. A computer program product in accordance with Claim 21, wherein the one or more computer-readable media comprise physical storage media.